

**“An Analysis of the
Forest Service’s Rural Community
Assistance Program
in the Southern Region”**

By

Donald B. K. English
Research Social Scientist
Southern Research Station
USDA - Forest Service
Athens, GA

Elizabeth Crane
Rural Development Specialist
Southern Region
USDA - Forest Service
Atlanta, GA



United States
Department of
Agriculture
Forest Service
Southern Region

R8-TP 32 Jan. 1999

**Working
Together
For Rural
America**



An Analysis of the Forest Service's Rural Community Assistance Program in the Southern Region

Introduction

The USDA Forest Service is concerned with the economic and social well-being of communities in and around the National Forests. The Forest Service mission Caring for the Land and Serving People, emphasizes the agency's role in rural development by integrating natural resource management and human communities. Throughout its history, Forest Service management has been closely linked to rural communities.

In the Organic Administration Act of 1897, one of the stated purposes for the establishment of national forests was to supply timber. The Sustained Yield Forest Management Act of 1944 articulated the role of national forests to protect and stabilize rural communities adjacent to federal forestland. Concern for the health and stability of rural communities near national forests continues today. All land management planning activities for national forests include analyses of local and regional economic impacts as well as consideration of community stability (Resource Planning Act 1985 Final Impact Statement).

Over the last fifteen years, the USDA Forest Service has paid an increasing amount of attention to rural development and to the economic and social health of rural communities located near National Forests (McWilliams, Saranich, and Pratt, 1993). During the 1980's the agency began to broaden its concerns beyond managing its National Forest lands to include a more comprehensive outlook toward the full range of all outputs, services stakeholders of forest resources. Agency management plans began to look at the relationship between Forest Service management and the stability and economic diversification of nearby communities.

The passage of the 1990 Farm Bill, Public Law 104-333, Subtitle G, Chapter 2, authorized the USDA Forest Service to provide technical and financial assistance to rural communities located in or near national forests. In response, the Forest

Service developed a program to accomplish this mandate, which has been titled the Rural Community Assistance program. In the development of this program, a primary emphasis was placed on flexibility in program implementation. In other words, each region was allowed to customize the delivery of its program via development of regional guidelines, project selection criteria, and funding mechanisms. In June of 1990, the Forest Service completed its national strategic plan, which established the following national policy on rural development:

The Forest Service will provide leadership in working with rural people and communities on developing natural resource-based opportunities and enterprises that contribute to the economic and social vitality of rural communities. The Forest Service can make lasting improvements in rural America by helping people solve their local problems in ways that enhance the quality of the environment in accordance with our existing authorities. (USDA-Forest Service 1990)

The strategic plan outlined six rural development goals with suggested ways to achieve each one. Each of the goals offers guidance on managing the agency's resources. The goals are to:

- Communicate to all Forest Service employees and the public that rural development is part of the agency's mission;
- Include rural development considerations in agency resource decisions to achieve long-term economic development and improved quality of life;
- Actively participate in planning and implementing community based rural development activities;

- Understand and integrate the needs of diverse communities;
- Strengthen Forest Service participation in cooperative USDA efforts at the local level;
- Develop and provide timely and current research and resource information.

With the passage of the Government Performance and Results Act (GPRA) in 1993, the Forest Service has been examining ways to be more specific in documenting accomplishments towards obtaining stated agency goals. Some performance indicators have been identified to assess progress towards achievement of the agency's goal to help rural communities in developing and implementing their objectives (Report of the Forest Service, Fiscal Year 1996, page 41). These indicators include the number of communities that have been assisted, the number of projects completed and ongoing, and the number of communities that have strategic plans.

The purpose of this paper is to demonstrate and test an approach to evaluating the effectiveness of the RCA grant program in the Southern Region. Targeted measures for economic, social, and demographic criteria are drawn from RCA guidelines and stated goals. Available data from both the RCA grant program and national databases describing economic and social conditions in rural areas are used. Results are discussed with reference to what can be inferred about the RCA programs effectiveness. In addition, caveats and cautions about interpretation are also provided. Suggestions for improved methods, data, and procedures are discussed.

Rural Community Assistance in the Southern Region

To better understand program goals and objectives, a brief history and context of the Southern Region's RCA program is helpful. Implementation of the Rural Community Assistance (RCA) program began in 1990, after the announcement of a Presidential Rural Development Initiative. The RCA program for the Southern Region is a cooperative effort between state forestry agencies and the Forest Service. The

Southern Region of the USDA Forest Service includes 13 states, ranging from Texas and Oklahoma to Kentucky and Virginia. At the Regional level, the RCA program manager makes program guidelines and policy decisions. In addition to that individual, each National Forest and each state forestry agency has a designated coordinator who is responsible for the delivery of the Rural Community Assistance program.

In fiscal years 1990 and 1991, the Southern Region received funding for two different types of rural development activities, Rural Development Initiative (RDI) project funds and Economic Diversification Studies (EDS). The Southern Region chose to have RDI proposals initially evaluated by the state foresters in the region, with final selections made by a regional panel. Selected projects were funded directly by the region, or sub-granted through the appropriate state forestry agency following the instructions of the appropriate state forester. Each region reviewed and forwarded a limited number of EDS projects to the Washington Office (Forest Service national headquarters) for final evaluation and selection. Funding for selected EDS projects was transferred to the region and awarded by the region following a national evaluation.

In fiscal year 1992, no RDI funds were allocated to the Southern Region as Congress earmarked all RDI funding that year for use in the northeast. EDS projects were selected in the same manner as in fiscal years 1990 and 1991. Implementation guidelines and funding for Economic Recovery (ER) grants was distributed to the region in February 1992. These guidelines were distributed through the Regional Office to the National Forests, State Foresters, State Cooperative Extension Director, State Conservationists, Resource Conservation & Development Councils, and Economic Development Districts. Subsequent regional program guidelines were distributed to State Foresters and Forest Supervisors. Regional emphasis was to obtain greater interaction between the National Forest System and state forestry organizations through State & Private Forestry programs.

Starting in fiscal year 1992, a minimum of \$5,000 was transferred to each national forest in the Southern Region to support a Rural Community Assistance coordinator as a collateral duty. These coordinators work directly with communities and through other Forest Service personnel providing technical assistance in the development of community action plans and grant proposals. Proposals and plans requiring funding were submitted to the Regional Office for final review and processing. Eligibility criteria of a rural community to apply for ER grants are listed below:

- (1) Must be located within 100 miles of the official boundary of a National Forest
- (2) Population is 10,000 people or less, or county population is less than 22,550.
- (3) At least 15% of the total primary and secondary labor and proprietor income is derived from wood products and forest-related industries such as recreation and tourism.
- (4) Community is economically disadvantaged as a result of Federal or private sector land management practices.

Subsequent amendments to the Farm Bill (Public Law 104-333, as amended through December 31, 1996) modified these criteria by further defining a rural county as one that is not contained within a Metropolitan Statistical Area (MSA). A community within a MSA, with a population of less than 10,000 people, meeting all other criteria, can also apply for ER grants.

Beginning in fiscal year 1993, a minimum of \$5,000 was transferred to each state forestry organization to support a Rural Community Assistance coordinator as a collateral duty. State foresters began sub-granting Rural Development funds to communities through authorities in the Cooperative Forestry Act of 1978. These grants require a 50/50 match of non-federal funds by the grant sponsor. In fiscal year 1994, EDS grants were administered through the regional offices. In the Southern Region, the EDS funds were split evenly between the national forests. In fiscal year 1995, some special grants were made to AmeriCorps: Rural Development Team sites to

support ongoing projects initiated by the USDA Forest Service AmeriCorps members. These AmeriCorps (AM) grants required a 50/50 match of non-federal funds by the grant sponsor and were administered by the USDA Forest Service, Southern Region.

Since 1990, the Southern Region's RCA program has awarded about \$5.3 million through 500 grants (Table 1). Over 85 percent of the grants (428), and about \$4.25 million (80 percent) of the grant money has gone to rural development (RD) or economic recovery (ER) grants. The remaining grants have been for economic diversification studies, national RCA awards, and AmeriCorps projects.

Examples of success of the RCA program are found across the country (McWilliams, et al., 1993). However since the passage of the Government Performance and Results (GPRA) in 1993, all of the Forest Service's programs have been under increased pressure to be more specific in documenting their accomplishments toward stated goals. The RCA program is no exception. To help quantify the results of the Southern Region's RCA grant program, this analysis was undertaken to assess how well that process has met stated policy goals. However, the number of grants awarded beyond the ER and RD categories was small, and their purposes were not as clearly defined. As a result, the analysis was limited to the 428 grants that were awarded from 1990 through 1997 in the ER and RD categories.

Policy Issues

During the period from 1990 to 1997, one implicit goal of the RCA program in the Southern Region has been to distribute grant money across the region as equally as possible. There are 13 national forest supervisors' offices distributed throughout the region. By working through the supervisors' offices, this goal has been more attainable. In the future, this goal is likely to be less important. Regional pooling of all RD funds will begin in fiscal year 1999, with representatives from all southern state forestry organizations and the USDA Forest Service selecting projects for funding.

Table 1. Southern Region Rural Community Assistance Grant Awards 1990-1997, by grant type .

Grant Type	Grants		Award Amount	
	Number	% of Total	\$ 1000's	% of Total
Americorps	34	6.8	471.3	8.9
Economic Diversification Studies	25	5.0	410.6	7.7
Economic Recovery	207	41.4	1,805.8	34.1
National Endowment for the Arts	6	1.2	114.0	2.2
Rural Development	221	44.2	2,447.3	46.2
Spirit Awards	7	1.4	53.0	1.0
TOTAL	500	100.0	5,302.0	100.0

Another related goal has been to reach a broad range of counties. The program has attempted not to send money every year to the same communities or grant applicants. Spreading grant money across the region has been one way the RCA program has been able to serve a broad array of customers of the National Forests.

In general, other underlying goals of the program are readily discernible from the eligibility criteria for RD proposals stated above, and/or from selection criteria given by the Region. A primary issue is concerned with location. In particular, RCA grants have been targeted to serve populations and communities that are either or both: (1) proximate to National Forest lands, and (2) in rural areas or small towns. In addition, the community should be dependent on forest industries.

RCA grants are intended to go to communities that have certain types of economic problems. For example, a principal concern is to have grants go to areas that have low levels of per capita income. Related characteristics include:

(1) high unemployment rates, (2) poor infrastructure or low levels of community services, (3) declines in business activity, and (4) high levels of population decline or outmigration.

Data

The Southern Region's Rural Community Assistance staff maintains a database on the grants that are awarded. Information items in the data base include: program type for grant authorization (such as Rural Development or Economic Recovery), fiscal year awarded, grant amount (both federal and nonfederal matching amounts), purpose of the grant (including both program links and codes for National RCA Accomplishment reporting), and binary variables for items such as whether the project has been completed, and whether the majority of the grant beneficiaries were minorities. A county code was determined based on the location of where the project took place, or the location of the sponsoring organization (for the few grants that affected more than one county). In addition, the name and

address of the sponsoring organization, and the phone number for a contact person for the project were also included. These data formed the starting point for this analysis. Information in the grant data base was combined with a variety of county-level secondary data describing the population, economy and location of the county relative to Forest Service land holdings obtained through the Social, Economic, Environment, and Leisure Attitudes (SEELA) data set compiled and maintained by the Southern Research Station Human Dimensions research unit in Athens, GA.

It was possible to establish a county location for 421 of the 428 grant projects. The seven grants that could not be geographically located were eliminated from the analysis. In total, these 421 grants were awarded about \$4.1 million in Forest Service funds. A few of the grants covered multiple counties. For these, the grant location was determined by the county wherein the group that applied for the grant was located. More likely than not, these groups were located in more populated counties at greater distances from Forest Service lands. The results is that the proportion of grants sent to metropolitan areas or to counties at greater distances from Forest Service lands may be slightly overstated.

Unfortunately, there is a difficulty presented by the discrepancy in the scale of the grant process and the scale of the available evaluation data. That is, the RCA proposals are generally made and evaluated with respect to conditions at the community level. However, objective measures for income, unemployment, and so forth, are generally available only at the county level. Thus it was possible to address the policy issues by looking at the proportion of grants and grant monies that went to various types of counties, and by comparing descriptors of these counties to similar counties which did not receive grants.

Results

Geographic Distribution of RCA Grants

In general, the process used by the Southern Region has assured some grants go to each of the 13 states in the Region (Table 2). The

number of grants per state ranges from a low of 20 in Texas (4.8% of the total), to a high of 54 (12.8%) in Mississippi. The grant dollars awarded appear to be distributed slightly more evenly than are the number of grants. Of these states, Texas still has received the least amount of money (\$233,200). However, this represents a slightly higher percent (5.6%) of the total dollars awarded. Arkansas has received the most grant money, over the past 8 years, about \$417,500 (10.1% of the total).

Proximity to Forest Service Lands

An issue identified by the selection criteria was whether grants were in general going to areas directly tied to Forest Service lands. Many RCA grants are intended to assist communities and areas that have been or can be adversely affected by Forest Service land management decisions. To evaluate this issue, counties in the South were grouped into four categories. The first category contained counties wherein there was Forest Service land. Counties in which there were no Forest Service lands were divided into three groups based on their proximity to the first type of county. These three groups were defined as: (1) counties adjacent to counties with FS land; (2) counties not adjacent to but within 100 miles of counties containing Forest Service lands; (3) counties more than 100 miles from counties containing Forest Service lands. Distances were measured from county centroids.

In general, most of the ER and RD grants were awarded to projects near Forest Service landholdings. The majority of both the grants (52.3%) and granted dollars (55.3%) went to counties that contained Forest Service lands (Table 3). About one-quarter of both grants (27.8%) and grant money (23.5%) went for projects in counties adjacent to those with FS holdings. Only about 2 percent of the grants (i.e., 9 grants) and 3.4 percent of grant moneys (about \$140,000) went to projects in counties more than 100 miles away from Forest Service counties.

The RCA grant process was designed to serve the population of rural areas and small towns. One way to check whether this goal is being reached is to examine the frequency of grant

Table 2. Distribution of RCA Grants and Grant Awards across States in the Southern Region, 1990 - 1997.

STATE	Number of Grants	Percent of Grants	Grant Awards (Total \$1000)	Percent of Awarded \$
Alabama	31	7.4	290.3	7.0
Arkansas	39	9.3	417.5	10.1
Florida	30	7.1	268.2	6.5
Georgia	25	5.9	261.5	6.3
Kentucky	24	5.7	279.2	6.8
Louisiana	40	9.5	397.2	9.6
Mississippi	54	12.8	362.3	8.8
North Carolina	31	7.4	341.1	8.3
Oklahoma	27	6.4	306.7	7.4
South Carolina	29	6.9	235.6	5.7
Tennessee	45	10.7	377.9	9.2
Texas	20	4.7	233.2	5.6
Virginia	26	6.2	360.5	8.7
TOTAL	421 ¹	100.0	4,131.1 ¹	100.0

¹ There were 7 grants for which it was not possible to determine an exact location; combined, these grants were awarded about \$122,000 of Forest Service money.

projects located in metropolitan counties. Overall, the vast majority of the RCA grants did go to rural counties. Only about 17 percent of both grants and grant money went to communities located in metropolitan counties. Most notably, only about eight percent of the grants and grant awards to counties that contained Forest Service land were also to metropolitan counties.

Another measure of success for the RCA grant process is in the number of different communities that benefit from the process. A total of 221 of the 1342 counties in the Southern Region (16.5%) had at least one RCA grant. Table 3 shows the proportion of counties in each of the proximity classes that received grants. Not

surprisingly, less than 3 percent of the counties that are more than 100 miles from FS lands received any RCA grant money. However, nearly forty percent (93 out of 236) of the counties that contain Forest Service land did have at least one grant, and about 21 percent (69 out of 329) of counties adjacent to Forest Service counties had at least one RCA project.

Serving Poorer Communities

It was noted in the previous section that almost none of the RCA grants went to counties more than 100 miles from Forest Service lands. By design, the RCA program benefits primarily the population and communities in counties close to

Table 3. Distribution of counties that received rural development or economic recovery grants, by proximity to Forest Service lands.

	Proximity to Forest Service land				All counties
	>100 mi away	Not adjacent, <100 mi away	Adjacent to FS county	Contains FS land	
Number of grants	9	75	117	220	421
Percent of grants	2.1	17.8	27.8	52.3	100.0
RCA Grant \$ (1000's)	140.1	734.8	972.1	2,284.0	4,131.0
Percent of grant \$	3.4	17.8	23.5	55.3	100.0
% of grants by category in metropolitan counties	33.3	12.0	33.3	8.6	16.6
# counties in Southern Region	288	489	329	236	1342
# counties with grants	8	51	69	93	221
% of counties by category with grants	2.8	10.4	21.0	39.4	16.5

National Forests. That is, the population in the counties that lie more than 100 miles from National Forests are not viewed as part of the primary market to be served by the RCA program. As a result, those 288 counties were removed from this and subsequent policy-related analyses. For these analyses, a series of t-tests were performed for a number of economic and social measures, evaluating whether the average for the 213 counties that had grant projects in them was significantly different (at the 90 % confidence level) from the 841 counties that did not receive any grant funding.

A key element in the RCA program is to serve communities that are economically disadvantaged. To evaluate how well this goal is being served, various income and economic structure measures were compared for counties that had some grant projects versus those that did not. Income measures included average income per capita and per household, median household income, percent of the population with income below the poverty threshold, and a measure of

income distribution called a Gini coefficient. The Gini coefficient is an index that approaches a value of zero if income is distributed equally through the population (i.e., everyone has the same income level), and approaches a value of one if income is distributed with total inequality (a very small portion of the population has essentially all of the income, and everyone else has none).

In addition to income, several economic structure measures were examined. These included growth in the overall number of persons employed, the unemployment rate and the percentage of jobs in several forestry and recreation-related economic sectors. Values for an index of economic diversity which ranged from zero (complete concentration of employment in one industry) to one (economic activity in every possible economic sector) were compared between counties that had received grants and those that did not.

For each of the income measures, the counties where grant projects were located had significantly lower income levels than those

counties that did not have any grant projects (Table 4). For example, per capita household income in 1993 was almost \$1,500 lower and the 1990 average household income was about \$2,800 lower in counties receiving grants. Counties with grant projects also had about 4 percent more of their population living in poverty. The income distribution measure was significantly higher in the counties that obtained grants, indicating that those counties had not only less average income, but also more unequal income distribution.

Counties that received grants had a higher proportion of jobs in both extractive wood industries, and in wood processing businesses. That is, grants did reach those counties that were likely to be affected more by swings in the timber and wood industry. There was not a difference between the two types of counties for the level of

employment in any of the three sectors most affected by the recreation and tourism industry. Overall job growth was about the same in grant versus non-grant counties from 1985 to 1990. For both types, there was average of between 9 and 10 percent growth in the number of employed persons. However, grants went to counties whose overall job growth was significantly lower from 1985 to 1995. The average percent increase in jobs was about 19 percent in counties that had grants, compared to slightly more than 22 percent in the other counties.

For many rural development programs, the number or proportion of people who are not working is often more important than the number who are. A specific criterion for many rural development programs, including the RCA program, is to provide assistance to locations with

Table 4. Comparison of economic measures, for counties within 100 miles of National Forests, Forest Service Southern Region

<u>Economic Measure</u>	<u>Counties with RCA grant projects</u>	<u>Counties without RCA grant projects</u>	<u>Significant Difference?</u>
1993 per capita income	\$ 14,242	\$ 15,667	Yes
1990 per capita income	\$ 9,474	\$ 10,585	Yes
1990 average household income	\$ 25,569	\$ 28,325	Yes
1990 median household income	\$ 19,842	\$ 22,494	Yes
1990 percent population in poverty	22.82	18.91	Yes
Gini coefficient (income distribution)	0.432	0.421	Yes
Percent jobs in:			
Timber and logging	1.645	1.279	Yes
Wood processing	4.530	3.441	Yes
Eating/drinking businesses	3.963	4.221	No
Hotels and other lodging	1.046	0.802	No
Recreation/amusement	0.843	0.872	No
Percent change, employed persons			
1985 - 1990	9.348	10.169	No
1985 - 1995	19.091	22.119	Yes
1990 percent unemployment	8.228	7.034	Yes
Economic diversity index, 1993	0.584	0.592	Yes

high unemployment rates. Counties that had received an RCA grant had a significantly higher unemployment rate (average of 8.23 percent) than did the set of counties that did not receive grants (average of about 7 percent).

In general, counties that had grant projects had less diverse economies than those that did not receive grants. In other words, workers were concentrated in a significantly smaller number of sectors in the counties that received grants. Concentration of workers in a small number of sectors generally indicates an economy that may be less stable because it is more reliant on the fortunes of those sectors that are represented.

Demographic Issues

Another goal of the grants is to reach communities that may have some other problems or disadvantages. Population loss or outmigration is often considered to be an indicator of economic

or social problems. To begin to evaluate this, we compared counties where grant projects were located to the remaining counties within 100 miles of Forest Service land along a number of demographic descriptors. These measures addressed housing, population growth, and the proportion of both minority and rural populations.

The average house value in 1990 in counties that had grant projects was about \$7,500 less than in counties that did not have any projects (Table 5). Insofar as housing costs make up a large portion of the cost of living, grant counties may have lower living costs than the other counties. Therefore, residents of grant counties may be somewhat better off in that their income has more buying power. However, if house value reflects the size and quality of housing, then residents of the grant counties may be worse off than residents of the other counties. Grant counties had a higher percentage of houses that were vacant in 1990 and

Table 5. Comparison of selected demographic measures

Demographic Measure	Counties with RCA grant projects	Counties without RCA grant projects	Significant Difference?
1990 Average house value	\$51,989	\$58,544	Yes
1990 Percent housing units vacant	13.454	11.891	Yes
1990 Percent housing units rented	21.709	23.613	Yes
Percent change, total population:			
1985 - 1990	1.182	2.394	Yes
1985 - 1995	6.921	9.595	Yes
Percent change, number of households			
1985 - 1990	5.146	6.800	Yes
1985 - 1995	11.103	14.265	Yes
1990 Percent minority population	24.069	22.185	No
1990 Percent population living on farms	4.023	3.978	No
1990 Percent population in rural areas	72.273	64.925	Yes
1990 Persons per square mile	74.892	197.747	Yes

a lower percent of houses that were rented. Home ownership can be a signal that the population has confidence in the economic and social climate of the area, and that they desire to remain in the area. Housing vacancies can occur when there is out migration of population, or when population does not grow as fast as expected by builders and developers.

During the last half of the 1980's the population in counties that have been served by the Southern Region RCA program grew at about half the rate (1.2 % average growth) of the other counties (2.4 % average growth) in the region that are within 100 miles of a National Forest. Population growth for both groups of counties picked up during the first half of the 1990's. Yet, when population growth during the ten-year period from 1985 to 1995 is examined, the counties where grant money went still had significantly lower percentage growth. Likewise, the percentage growth in the number of households was smaller in the counties that obtained RCA grant funding. From 1985 to 1995, there were an average of about 11 percent more households in counties that had grant project locations, compared to over 14 percent in the other counties.

Grant counties were also more rural and less densely settled than the other counties. Although the percentage of the population living on farms was not different between the two types of counties, the percentage of the population living in rural areas was over 7.5 percent higher in the grant counties. In addition, the population density for the grant counties was about 74 persons per square mile, compared to nearly 200 people per square mile in the other counties. There was no difference in the percentage of minorities in the populations of the two types of counties.

Social Issues

Criteria for selection and funding of RCA grant proposals are limited to economic and demographic issues, and do not include any explicit consideration of social conditions. However, there are several social measures that are related closely enough to the economic criteria (income, employment, etc.) to merit attention. These

include education, female-headed households with children, births to teenage mothers, and families enrolled in the Aid to Families with Dependent Children (AFDC) program.

The average level of education is one indicator of the stock of human capital in a population. The greater the education level the better able is the population not only to withstand and adapt to economic and social stresses, but also to achieve and sustain its goals for growth and development. Results indicated that counties with grants had a significantly lower level of educational attainment than did counties that did not have any RCA projects (Table 6). Grant counties had a higher proportion (20.1%) of the population (age 25 and up) with no more than a ninth grade education than did other counties, wherein an average of about 18.4 percent had only gone through ninth grade. In addition, counties with grants had lower proportions of the adult population that had finished high school (31.07%) or had completed college (7.05%).

The proportion of households that are headed by women can be another indicator of economic and social susceptibility, especially if there are children in the household. In general, income in such households is lower, and they can be affected more by economic downturns. Counties that had at least one RCA project had a higher percentage of female headed households, and female-headed households with children. In grant counties, somewhat more than 17 percent of the households headed by women, and more than half of these (9.5 percent of all households) also had children. In the other counties, about 15.9 percent of households were headed by women, including 8.7 percent that also contained children.

Teenage pregnancies have been identified as a source of societal concern because of greater health risks, reduced economic and educational opportunities. Counties that had RCA grants had a significantly higher proportion of births wherein the mother was under the age of 20 than did the non-grant counties. In the counties that had at least one grant project, almost 20.5 percent of births in 1990 were to teenage girls, compared to about 18.7 percent of births in the remaining counties.

Table 6. Comparison of percent change in selected social measures.

<u>Social Measure</u>	<u>Counties with RCA grant projects</u>	<u>Counties without RCA grant projects</u>	<u>Significant Difference?</u>
1990 Percent pop. <9 th grade education	20.128	18.420	Yes
1990 Percent pop. with high school degree	31.069	31.750	Yes
1990 Percent pop. college educated	7.049	7.659	Yes
1990 Percent households female headed	17.239	15.886	Yes
- and with children	9.462	8.655	Yes
1990 Percent births to teenage mothers	20.494	18.719	Yes
1990 Infant Mortality rate (%)	1.108	1.033	No
1990 Local Govt. spending per capita (\$)	1,043.22	1,107.69	Yes
1990 # AFDC families / 1000 families	7.192	10.818	Yes

However, there was no difference in the infant mortality rate between the two types of counties.

To the extent that local government spending indicates the level of services provided to residents, counties that had RCA grants are somewhat worse off than are the remaining counties near Forest Service lands. In 1990, the average amount of local government spending per capita was about \$1,043 in counties that had grant projects. The average for per capita spending by local governments in non-grant counties was about \$65 more, at nearly \$1,108 per person. It is not clear exactly what services are provided by these local governments, nor what differences in provision costs there may be. However, one reason for higher per capita spending in non-grant counties may be due to a higher incidence of recipient families in the AFDC program. In non-grant counties, about 11 out of every 1000 families receives some form of government assistance through AFDC. In counties with grants, only about 7 of every 1000 families receives such assistance.

This difference in the rate of AFDC recipient families seems somewhat anomalous, given the previous findings that grant counties have lower levels of income, education, and economic diversity, yet greater poverty, unemployment, and female households with children. The most obvious conclusion is not that grant counties have less need for such assistance, in that fewer families qualify, and hence the lower rate. Instead, it would seem that the lower rate of assistance indicates a lower level of service, despite a higher level of need.

Discussion

It appears that the selection process for RCA grants in the Southern Region is consistent with program goals. Insofar as it was possible to determine, projects that have received funding have been located in counties that are at a greater economic disadvantage than are other counties within 100 miles of National Forests. The grant counties showed significantly lower levels of

income, education, economic diversity, population growth, job growth, population density, housing values, and government spending per capita. These same counties had greater levels of unemployment, dependence on forest industries, female-headed households, and births to teenage mothers.

Unfortunately, the difference in scale between projects proposed for grant funding and the economic, demographic, and social data used here makes it impossible to be more specific about the effectiveness of the RCA program. Grants are generally targeted to communities or sub-county areas. Clearly, the conditions in any particular small community could be at least partially masked by geographically coarser county-level data. The data maintained by the RCA staff often indicates a primary town or city served by the grant. To have more specific evaluation of the grant program, it is critical that the location of the grant project be consistently and completely identified. That is, the central location of the grant, and some measure of the market areas served by the grant project would be needed additions to the RCA grant database.

A greater challenge is to have more spatially specific data with respect to the desired social and economic measures. Typically, such data are collected and maintained at county scales. Better analysis would require having information specific to the communities and market areas served by each grant project. Then, as more spatially disaggregate economic and social data become available, it should be possible to examine the characteristics of the specific communities that benefit from RCA grants, as well as compare these communities to the population of communities that could potentially be served in the Southern Region.

Research of this type could be an important application of emerging GIS technology. Market

areas served by RCA grant projects could be one overlay, and social or economic measures in communities and sub-county areas could be another. Maps of this sort would allow analysts and planners to visually examine the co-incidence of grant funding and the types of economic and social disadvantages the program is intended to combat.

A related research issue would make comparisons similar to those presented here between communities that received funding and those communities eligible for grant funding who submitted grants, but did not receive funding. In a sense, this is the most relevant comparison, since those communities that did not submit grants are not in the population of communities that can be served by the RCA program. To accomplish research of this nature, it would be necessary for RCA program coordinators at the state and forest levels to retain information about all unfunded grant proposals, including project type, location of the grant project, requested grant amount, and why a proposal was not funded.

The Forest Service remains concerned about promoting the economic and social stability in rural and forest-dependent communities. The RCA grant program has been one element in the Forest Service strategy for accomplishing its rural development goals. The evaluation process presented here is somewhat inconclusive, due more to a lack of data describing the social and economic situation in rural sub-county areas. However, it appears that in the Southern Region the current grant selection process has been successful in ensuring that the available money has been targeted to go to projects in counties that have greater than average needs.

Literature Cited

USDA- Forest Service. 1990. A Strategic Plan for the 90's: Working Together for Rural America. Washington DC: US Government Printing Office.

McWilliams, R., R. Saranich, and J. Pratt. The Forest Service s Investment in Rural Communities. *Annals, American Academy of Political and Social Science.* 529(1993):128-139.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, gender, religion, age, disability, political beliefs, sexual orientation, and marital or family status. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at 202-720-2600 (voice and TDD).

To file a complaint of discrimination, write USDA, Director, Office of Civil Rights, Room 326-W, Whitten Building, 14th and Independence Avenue, SW, Washington, DC 20250-9410 or call 202-720-5964 (voice or TDD). USDA is an equal opportunity provider and employer.
